Vermont Department of Environmental Conservation Responsiveness Summary

To Public Comments Regarding:

The Final Draft of the White River Basin Plan

On July 31, 2002 the Vermont Department of Environmental Conservation (DEC) of the Agency of Natural Resources (ANR) released a final draft of the White River Basin Plan for a 64-day public comment period. The public comment period, which ended on October 2, 2002, included three public meetings. The meetings were held in White River Junction on September 3, in Rochester on September 12 and in Randolph Center on September 18, 2002.

The DEC prepared this responsiveness summary to address specific comments and questions and to indicate how the plan has been modified. The comments below follow the outline of the final draft. Comments may have been paraphrased or quoted in part. The full text of the comments is available for review or copying at the Essex Junction Regional Office of the Department of Environmental Conservation, 111 West Street, Essex Junction, Vermont 05452.

General Comments

Comment: There is not a sufficient body of data on everything from pathogens to fish habitat. The recommended strategy #24 on page 44 proposes coordinating existing data on fish habitat, but more data needs to be gathered, too. Data is expensive to get and maintain, and the Agency may not have been given the resources to do the job. This shortcoming should be acknowledged, as well as the likelihood of not having the data again in the future unless funding increases.

Response: State and federal funds are limited. The purpose of the plan is to encourage collaborative action within the basin by a variety of stakeholders, not just the Agency. The expectation is that some funding will come through grant applications, see the last page of Chapter 1 in the plan. State and federal agencies may also use the plan to support budget requests.

Comment: Where better data is being gathered, such as through the stability assessment, recommendations are too general in approach, such as strategy #4 on page 25, instead of targeted at specific areas. This lack of specificity is understandable, and provides flexibility, but may also lead to inaction. Level II assessment and at least some prioritized reaches would lend some detail to the magnitude of the problem and credence to the belief that stabilization efforts will take place on a meaningful level.

Response: In Chapter 5, the Upper White River, Ayers Brook and the Second and Third Branches are identified as needing stream bank stabilization.

Comment: Enforcement is overlooked as one tool to help achieve water quality. Some of this is tied to a lack of sufficient data, as noted in the second paragraph on page 47, to justify enforcement. Some of this may also be due to lack of funding for staff. In our dealings with local officials, there is also a notable skepticism about the Agency following up on any complaints they may have about water quality violations. Violations of Acceptable Agricultural Practices are commonplace and rarely, if ever, dealt with by enforcement action. Junkyards are also a steady source of complaints. Though enforcement is properly resorted to only after voluntary measures have failed, the Agency should be more direct in the plan about its ability, duty and willingness to use enforcement measures.

Response: Enforcement is a routine activity of the Agency of Natural Resources and the Department of Agriculture, Food and Markets. This comment concerning the lack of follow-up on complaints will be brought to the attention of appropriate state officials. The purpose of this plan is to strengthen collaboration within the community and specify how ANR can best assist in these efforts.

Comment: The plan should not increase the amount of regulations.

Response: The plan does not create new regulations; however, Chapter 6 of the plan does identify waters that may receive higher protection from existing regulations than afforded by present water quality classification. The plan includes a proposal to increase protection for some surface waters that are presently designated Class B. DEC consulted with towns to ensure that the proposed level of protection was compatible with the community's expectation for land use adjacent to the surface waters. In addition, the plan identifies existing uses that must be protected in specific surface waters. Other existing uses not listed in the plan are identified on a case-by-case basis if permits for discharges to surface waters are contemplated.

Comment: The basin planning process should use common sense.

Response: The process focuses on concerns that the public has identified (Chapter 4) and includes recommendations that have been developed collaboratively with other state, federal, local and nongovernmental organizations and individuals. The participation of a large number of partners in the planning process helps ensure that common sense is used.

Comment: The plan should support local initiatives, especially with regard to river restoration projects.

Response: DEC developed the sections of the plan on remediation with help from the White River Partnership and other community members to ensure that ANR's work would focus on supporting community-led projects financially and technically.

Comment: Waste from farms should be directed towards a commercial use such as producing energy from methane gas.

Response: Two projects involving manure digesters and methane production are running in Vermont. The technology is still new and most farms cannot afford it. There is an economical minimum amount of manure needed to produce electricity and most Vermont farms are not large enough. The process involves a manure separator that takes out the

liquids. Liquids are stored and then spread as fertilizer. A digester composts the manure and releases the methane. The methane is captured and piped into a furnace to produce power. The remaining solid manure is less odorous, mostly composted and is spread on fields.

Comment: Plan needs to be in layperson terms and shorter

Response: DEC is required by state and federal regulations to include information that may not be of interest to all people (see the Statutory Index in the plan). A 13-page summary of the plan is available for people who would rather read a concise version. The summary is available for review at

http://www.anr.state.vt.us/dec/waterq/Planning/WRBPsummaries.pdf or in paper form on request. DEC has written the basin plan with the layperson in mind and would appreciate receiving suggestions for improvements.

Comments: I am concerned that plan will require towns to do more.

Response: The plan describes opportunities for the town to work with others to maintain or improve water quality.

Chapter 3. Water Quality in the Basin

Comment: Your report should acknowledge the impact that Vermont Pure's removal of water might have on the White River Basin. Vermont Pure this last spring and early summer took approximately 120,000 gallons a day out of their springs on Rogers Road. Additionally, the company now has a permit application before the department to develop three more springs on Rogers Road and to remove 280,000 gallons a day from their Rogers Road site. This total is more than the total of irrigation and animal watering water removed for the whole basin. Vermont Pure has access to 5 million gallons of water a month from a supplier in Stockbridge; this amount would serve almost all the company's bottling capacity and would maintain all the local jobs. The issue is harm to the local environment and ecology. The aesthetics of a stream are destroyed when the stream is denied the water it had subsisted on. Additionally, wetlands along the stream dry up. As a final point, fish recede from the stream; many local residents will tell one that before Vermont Pure came to Blaisdell Brook it was fished for trout, but no trout have been seen for years.

Response: The information DEC has on Blaisdell Brook does not indicate that the present water withdraw by Vermont Pure Springs, Inc., (Vermont Pure) results in a violation of the Vermont Water Quality Standards (Standards). Based on the comment, however, DEC will schedule further assessments of the stream.

Vermont Pure submitted information with its Act 250 permit application in 1993 to demonstrate that the project would not violate the Standards regarding biology and the aesthetics of the stream among other parameters. A DEC bioassessment of the Brook in 2001, 1.6 miles from the confluence with the Second Branch, indicates that the health of the macroinvertibrate (bug) community was very good.

DEC will change the typing proposal for Blaisdell Brook to better reflect the existing Act 250 permit conditions for the withdrawal of water. The proposal in the draft plan

designates Blaisdell Brook a Water Management Type (WMT) 2 (see Chapter 6 for an explanation of typing and classification.). The revised proposal will change a section of Blaisdell Brook to WMT 3. This section of the brook begins at the location where Spring A as identified by Vermont Pure enters Blaisdell Brook. This segment continues downstream to the confluence of Blaisdell Brook and the Second Branch of the White River.

DEC's decision to designate a section of the Brook WMT 3 in its proposal is based on calculations of water flow. The permitted withdrawals from Spring A, which flows to the Brook, has the potential to reduce the volume of the stream flow to result in a more than a minor change to the habitat. The change in habitat referred to is from reference or natural conditions. Below the confluence with Second Branch of White River the change in flow is considered minor.

The recommendation to designate a segment of Blaisdell Brook WMT 3 will be forwarded as a part of the plan to the Vermont Water Resources Board. The Board in a rule-making setting will consider the recommendation in a full public process.

DEC will review any new application by Vermont Pure to alter its operations for compliance with the Water Quality Standards.

Comment: The economic value of Vermont Pure to the community should be balanced with any potential impact to the environment.

Response: DEC agrees. The Vermont water quality policy (10 V.S.A § 1250), states that the management of waters should "allow beneficial and environmentally sound development."

Comment: Road salt is a problem. Vermont Agency of Transportation is using much more than in the past based on his observations of the salting of his road Response: DEC requires the Vermont Agency or Transportation (VTrans) to keep track of the weekly use of sand and gravel in each VTrans Maintenance District and compare it to a five-year average. If the usage exceeds the five-year average, VTrans must notify DEC. DEC has not received notification that usage in any district is above average use. It is possible that a specific road is receiving more salt or sand than in previous years. Individuals who are concerned about a specific road are encouraged to call their local Maintenance District. In the White River Basin, the district office can be reached by calling 802-295-8888.

Comment: The plan focuses too much on pathogens and nutrients in relationship to the list of problems first presented (Table 2).

Response: Chapter 3 does include equal amounts of information on the five most prevalent water quality problems listed in Table 2; however, the discussion on remediation focuses more on the primary problem, sedimentation, than any other.

The problems identified in the plan include community-identified problems (local concerns in Chapter 4) and the water quality problems of specific waters (Chapter 5). The

section on local concerns included streambank instability (main source of sedimentation) and the section regarding specific waters identifies streambank erosion or instability as a problem in the greatest number of river miles with water quality problems.

Pathogens are dealt with indirectly in addressing the local concern regarding increasing awareness. DEC recognized that although pathogen contamination may not be one of the top three problems in the watershed, the public has identified the threat of contamination as a concern that requires attention.

Within the section on specific waters, the Vt. Department of Agriculture, Food, and Markets and the U.S. Natural Resources Conservation Service identify programs available to assist in water quality improvement that include nutrient reduction as well as streambank stabilization. The voluntary suggestions for improving water quality are based on a whole farm assessment, not just the water quality problems identified by DEC.

Chapter 4 – Local Concerns

Stream Channel Instability

Many of the comments expressed concern regarding the condition of the rivers in the basin. The following comments are followed by a comprehensive response. The DEC staff is available to meet with any person to inspect erosion and flooding problem sites and to provide technical assistance and identify resources available to help protect their property.

Comment: For the last five years I have been losing acreage because of the changing course of the Third Branch. This extreme change only began after the state wouldn't let the town extract gavel from the bed anymore. Gravel bars have formed and have caused the loss of the land.

Comment: There is a lot more gravel it the Third Branch of the White River in Braintree than there was a decade ago and all this extra gravel is destroyed the fishing, eliminated the swimming, is responsible for some of the flooding during 1998 and is causing the loss of productive agricultural land annually. The answer is not to restrict virtually all gravel removal but to devise a method to determine how much gravel can be removed without causing more damage than it cures while still satisfying those paying the bills and living in the White River Basin.

Where is the gravel that the town puts on my road and washes into the stream ultimately supposed to end up as a final resting place? If all rivers were operating properly, I guess my gravel should someday end up in Long Island Sound forming a new delta not unlike that at the mouth of the Mississippi River. I can't understand why that is far superior to keeping the Braintree gravel in Braintree.

I believe people do understand the ANR approach or would understand your approach, as far as the rationale behind your thinking, if you weren't so militant that virtually any gravel removal is bad. Sure too much removal is bad but no removal is equally bad and worse in some folks eyes. People feel that you abandoned your common sense when you received you college degree.

What if you charged a "tariff" on each yard of gravel removed; say \$.25, to pay for the ANR person who would monitor the operation to be sure it was done properly? It seems quite inappropriate for ANR to generate a policy that they are not able to properly administered.

Comment: I live in Randolph on the Third Branch of the White River. Since we stopped removing gravel we have had serious erosion problems to our meadows. We need to simplify the permit process for gravel removal and the placement of rip rap. The benefits from removing gravel are too numerous to mention. I would be willing to tour the River with you and discuss the problems and benefits.

Comment: Fishermen do not frequent the upper White River anymore like they did when gravel was removed from the river. Gravel bars should be removed and provided to the towns for road improvements.

Comment: Hot spots along rivers where gravel bars are causing problems should be looked at and addressed (removal of gravel). One area in particular is the gravel bar on the main stem of the White River across from the Fox Stand Inn. Money is also needed to address problem.

Comment: For the past 50-60 years my husband's family was deeply involved in town government. All those years the small towns up and down the White River mined river gravel. Besides saving money, they saved the river and its banks. Since mining river gravel was outlawed, more and more roadways and adjoining fields have been eroded. The now shallow river simply rises, spreads and takes all in its path. Where the equipment worked they also left access road ways for recreational uses of the river. All my life I've been told and read of wonderful fishing in the tributaries of the White River. It was know to be on of the most pristine in U.S. when I was much younger. It is only sensible to manage it again as well as our ancestors did.

Comment: The trout and fish population would do better in a summer river that offers some deeper pools and cooler water. It's distressing to drive along the river and see numerous places where one can almost walk across without getting wet and where large islands are developing. Also, I recall that when the gravel ban went into effect it had a financial impact on the communities that used to meet some of their gravel needs from the river. Moderate and careful gravel removal should be permitted for the good of the river and fish habitat (and all the better if this saves some towns some money.)

Comment: I am concerned that the policy of not allowing abutting farmers and local municipalities to remove gravel from these rivers is having an adverse

affect on the flood levels and the fishing as well. When the rivers were not hemmed in by roadways and development--some 160 years ago or more--it perhaps made sense to let nature control the flows and path of our rivers. However, we have dramatically altered the ability of the White River to change its course in response to the natural build up of gravel washed into it over the years.

Without some way to balance this gravel build up, the river is NOT being allowed to follow natural laws anyway.

The White River has been dramatically changed over the passed 20 years and more by gravel bars, which slow the flow and ruin fish habitat. This is obvious not only to fishermen, but to anyone who drives Route 14, Route 107 or Route 100.

I urge consideration of a well-reasoned policy of municipal gravel removal and removal by permit for abutting farmers and others whose efforts would improve stream flow and reduce the dangers of flooding.

Comment: I believe that some gravel should be allowed to be removed from the river, especially at places where it is causing the river to erode land in towns (like behind Bethel's Church Street) and where it removes agricultural land, like the Kennetts.

I basically believe in leaving the River alone to adjust herself, and for natural processes to re-establish themselves. However, we should not be so rigid in our attitudes (and regulations) that we don't allow for some gravel to be removed and used. Perhaps taking relatively small amounts out from key spots would help those landowners, would add to the stock of available gravel, and would help us learn if some flexibility wouldn't be good in the future.

Comment: The White River and its tributaries have lost most all of its historic fine fishing and scenic beauty due to:

- 1. The normal water flow has been rerouted either running through the gravel or widened out giving less apparent depth.
- 2. The deep cool holes are now filled with gravel.
- 3. There is no defined channel as there used to be. It is spread through the large gravel rocks that extend nearly half of their diameter to the sunlight, thus warming the water.
- 4. As a result of the increase of gravel retained in the channel and built up on the sides, there is much less water capacity during normal heavy rains, thus causing more low land flooding.
- 5. If the gravel that has been eroded from the banks and steep hillside streams is allowed to remain in the river bed there will continue to be more and more flooding and less and less fish life.

The solutions would be to remove certain gravel bars above the normal water flow. With the advent of tracked excavator equipment there is nearly no disturbance of the gravel under the surface that is excavated.

Comment: My wife and I have owned the White River Golf Club, located in the town of Rochester since April 1997. While we are supporters of "the plan," we harbor a certain amount of skepticism about what will result from this initiative.

Throughout our ownership we have seen three floods that approached levels that many of the local residents had not seen in 25 to 50 years. We have seen dramatic changes to the river channel along our property. FEMA provided us with a \$60,000 loan to repair damages done by the river after the June 1998 flood. Lesser damage also occurred in the other floods.

While the work of civic groups like the White River Partnership is more than admirable, we wonder how upstream work affects us. Although we are not advocates of flagrant gravel mining from the river, we question whether the ANR's policies with respect to gravel render land valueless or incapable of supporting the livelihoods of the owners. The installment of upstream revetments may have opened up large rifts on our land, knocking down trees and destroying property when they break loose during high water events.

Trees that I have planted were uprooted or broken in half by ice and debris that floated over the golf course due to a gravel bar in the middle of the river.

We received ANR and federal permit to relocate this gravel bar and bought \$800 in erosion control materials, but were told within a few days by the Act 250 Commission Springfield office that work would need their approval as well. In my opinion we, the landowners, have repeatedly demonstrated our willingness to responsibly embrace land stewardship while the agencies of the State of Vermont have only stymied our efforts.

Comment: About 20 years ago an elderly Sharon resident was fishing frequently in a private pond in N. Pomfret that I help care for. Each spring the owners paid to have the pond stocked with fish. We liked Mr. Moran but he never offered to pay for the fish. And we were a little annoyed by the fact that he lived immediately across Rt. 14 from the White River. One day I asked him why he drove all the way to Pomfret to catch private stock when he lived on Rt. 14 across from the White River. He looked very sad, he told me that all the old fishing holes in the river had "washed out." I don't fish but I do know that fish need the cold, oxygen-rich water found in deep pools. The following weekend I hiked along the White River. The holes are not "washed out." They are buried under as much as twenty feet of gravel. And here I refer specifically to a huge gravel bar just below the island near the Hartford-Sharon town line. 30 years ago young people swam there, the water was cool. Now the river is wide and shallow. On hot days the sun quickly heats the shallow river to a tepid temperature. Many years ago another generation hauled gravel out of that spot and actually created that island. I wouldn't say that those old men destroyed any environment. Interstate 89, Rt. 14, parking lots, and the roofs of hundreds of buildings shed so much water that the river level fluctuates tremendously. Even with the extra capacity created by those previous generations Rt. 14 still floods at that point. And this past spring when the river flooded there was a horrific stench of manure all up and down this valley, it was like entering a manure pit! The rivers west of here a so

clogged with gravel and silt that the rivers washed through some of the best farm land in this part of Vermont, eroding the land and further silting the river beds.

How can you use the word "Natural" to describe any thing about the White River? To do that don't you have to pretend that I-89 and Rt.14 and all their storm drainage systems don't have any effect on the river levels and gravel creating erosion.

Down below the Vt. Law School in South Royalton gravel buildup in the river bed is diverting and accelerating the force of the water toward a 20 ft. high gravel bank and several acres of land have already been cut away to pollute the river downstream.

And last but not least. Has anyone thought about what all that debris in the rivers is doing to our power dams? Isn't impoundment capacity being diminished?

Comment: Some of the gravel could be removed in problem areas and the river bank stabilized with native vegetation to reduce the erosion that is taking place. We are losing acres of land to the river. The Towns could certainly use the gravel maybe something can be done on an experimental basis to find a solution to our ever-growing problems.

Summary of River Stability Comments:

The fishing and swimming were better before the State limited gravel mining. Some commenters support regulations that restrict work in the river to some extent; however, all commenters advocate a state policy allowing gravel bar removal in hot spots, especially where the river threatens agricultural land and infrastructure. Hot spots mentioned include the Kennett's property and the White River Golf Course on the Upper White River, across from the Fox Stand Inn in Bethel, below the Vermont Law School on the White River, areas around Locust Creek, and areas along the Second Branch and the Third Branch, including behind Church St. in Bethel.

Response: It is a common misconception that, within the White River watershed, flooding and erosion problems did not exist when river channels were "maintained" through gravel removal. Widespread damage along the White River and its branches was experienced in 1973 and 1976; the heyday of gravel mining. In fact, excessive gravel mining and other management activities are the main reason for the flooding and erosion experienced today. Limited gravel removal continues to be an acceptable alternative to deal with erosion and flooding conflicts where the physical adjustment processes of the river will be influenced in a way that reduces the long-term conflicts. Otherwise, we are just pushing the problem into the future to be dealt with by our children and grandchildren.

The following description of past activity on the Third Branch and the river's response is a good example of what has happened elsewhere in the White River Basin. Throughout the 1970's until the mid 1980's the Third Branch was the river most heavily mined for gravel in the entire state of Vermont. The Department of Environmental Conservation, (DEC), played a very important role in the implementation of this type of channel management activity through that time period. DEC not only provided regulatory

authorization to remove tens of thousands of cubic yards of gravel annually form the river channel but also made technical recommendations to excavate gravel to help alleviate flooding and erosion problems. DEC staff made dozens of inspections trips overseeing the gravel removal operations and spent many man-days of effort to observe, measure, evaluate, and understand what were the physical consequences of gravel bar removal as they related to channel stability and bank erosion.

After nearly a decade and a half of evaluation, it became clear to DEC that the effect of gravel bar removal was just the opposite of what would seem to be its most obvious result. River gravel excavation on the Third Branch was actually increasing the rate of bank erosion and exacerbating channel instability. Two assessments over the last five years have confirmed the conclusions of DEC regarding the physical effect of gravel bar removal on the present conditions and adjustment process of the Third Branch. One was conducted by the U.S. Department of Agriculture and the other by the VT Geological Survey in partnership with the Third Branch Stream Team; a subgroup of the White River Partnership.

The primary result of historic gravel bar removal on the Third Branch was to contain greater flows within the channel rather than allowing floods to spread out in the flood plain. This translated into greater stress on the bed and banks and created a vicious cycle in which the increased stress against the channel boundaries produced more sediment (sand and gravel) that built the bars. When people removed the resulting bars, a deeper channel was created, which contained more flow in the channel; caused more stress and erosion of the banks and so on.

Throughout the Third Branch from Bethel to Braintree, the excessive erosion has caused the river to largely abandon its historic flood plain. It is presently in the process of forming a new flood plain at a lower elevation. The result is an over widened and shallow river; however, the gravel bars we see today are the beginnings of the new flood plain. If the river is allowed to complete this adjustment process, it will re-establish a narrower channel with deep holes for fish and swimmers alike. Most importantly, the river will have a new flood plain that will help the river maintain a stable course. Our vision for the river must extent beyond the immediate future as the adjustment could take decades to complete.

This evolution to a stable condition is, of course, an ideal end point provided it could be accomplished without people losing land or having our transportation infrastructure or homes threatened by bank erosion; a result of the physical adjustment process. Oftentimes, because of these constraints created by our myriad investments on the landscape, the alternative is to either implement expensive bank armoring projects or go back to dredging or mining gravel. The problem with either of these options is that they usually ignore or are in conflict with the physical requirements of the river system. Activity that ignores the requirements of the river can create an even more uncontrollable and public-safety threatening situation for future generations.

Complicating the whole scene is the simple fact that much of our land use values and expectations along the river valleys have been built and maintained over the past 150 years upon the premise that we could channelize and contain the river through gravel removal. Little did we know that we were actually creating was an uncontrollable monster that would rear its ugly head every few years such as in 1927, 1938, 1973 and 1998.

DEC is working with its partners in other state and federal agencies, watershed groups, communities and landowners, to create opportunities to return to a sustainable relationship with the river. DEC has assisted with river assessments, including the Third Branch assessments. In addition, staff from the DEC River Management Program work with individual landowners, the White River Partnership and state and federal agencies to design and permit river restoration projects. DEC does consider the removal of gravel in river restoration projects and supports its removal if it is in the best long-term public interest.

Conflict between river corridor land uses and riverine flooding and erosion is as old as our imprint on the landscape. Traditional flood plain and channel management practices implemented to reduce or manage these conflicts have largely worsened the problem out of a lack of respect for or understanding of the physical requirements of river systems.

We can all agree and recognize that the pattern of land use investment and expectation along river corridors is not sustainable without some level of intervention or channel maintenance. The key is to assure that the maintenance that is done is informed through acknowledgment of mistakes made in the past and moves us all toward a more sustainable and mutually beneficial relationship with the river. DEC staff is available to meet with any person to inspect erosion and flooding problem sites to provide technical assistance and identify resources available to help resolve such conflicts.

Comment: Restoration work should begin at the top of the watershed to stabilize banks. In addition, ANR should understand that vegetated buffers are not the only answer. Response: DEC agrees. Restoration projects are best protected by stable upstream areas, which requires that restoration efforts begin at the top of the watershed and work downstream from there. The final draft states on page 26 that, "[r]estoration projects should take place where upstream sites have been stabilized..." and "[p]rojects should focus on areas in the headwaters...." DEC also agrees that restoration should begin with stabilizing the channel, where needed, before planting.

Comment: Landowners should not be responsible for paying to fix the river to protect or reclaim their land.

Response: Presently, state and federal funds and technical advice are available to assist landowners in addressing erosion problems. DEC staff is available to meet with any person to discuss available resources. State and federal budgets limit the level of funding and assistance.

Comment: The Army Corps of Engineers process should be streamlined and permits easier to obtain.

Response: This is something that DEC will attempt to do in the future. The negotiation process with the Army Corps of Engineers (ACORE) has not started yet and it is difficult to predict the outcome. The concept is that for individual ACORE permits (outside the general permit) DEC hopes to have certain project type criteria that would allow a project to be processed more quickly.

Comment: Strategy #8 should be change to read: Develop criteria for allocating state river allocation funds and technical assistance that prioritize projects in watershed that have begun a geomorphic assessment, in towns with riparian buffer protection, including zoning set backs from water and shoreline management policies and road maintenance techniques.

Response: Strategy 8 now includes the language suggested in the comment above.

Public Access

Comment: Need to clarify in Strategy 19 in Chapter 4 that when increasing access points during the construction of a new bridge, private land should not be considered for trails or access unless the landowner is willing to sell.

Response: Strategy 19 now includes the language that any new property needed for an access point should be acquired from a willing landowner.

Fisheries

Comment: The salmon restoration program is hurting the trout population.

Response: Atlantic salmon were present in the White River drainage over 200 years ago when the resident fish community was much simpler. At that time, brook trout was the only trout species found in our streams. Now, self-sustaining, wild populations of rainbow trout and brown trout have become established through introductions from the West Coast and Europe.

Concerns of reintroduction of Atlantic have primarily been raised for rainbow trout, as these species do not naturally co-exist together. (Atlantic salmon naturally occur with brown trout in Europe, and with brook trout in North America.) Some studies have suggested negative interactions between Atlantic salmon and rainbow trout based upon laboratory experiments, but research on population level effects are limited.

A given stream has a certain amount of food and physical habitat to support trout and salmon populations in a given year. While different species may partition these resources, competition may occur if one or more of these needs are limited. This can be said for stocking hatchery-reared trout on wild trout populations as well. It should be noted that salmon are also better suited to warmer stream reaches that will not support

trout, so they fill otherwise unused habitat. The Vermont Department of Fish and Wildlife and other federal agencies have looked at trout population trends in many streams within the White River Basin where salmon have and have not been stocked over the past 15 years. These results have been mixed:

- There is no indication of negative impacts to rainbow trout reproduction levels in streams stocked with salmon.
- While some streams stocked with salmon have shown declines in older classes of rainbow trout, others have not.
- Similarly, some streams that have NOT been stocked with salmon have shown declines in older classes of rainbow trout, others have not.

As with most programs, the goal of restoring a native salmon population to the Connecticut River basin is not without tradeoffs. While there is no clear evidence that salmon stocking is negatively impacting trout populations, we acknowledge there are risks. Several important trout spawning tributaries in the White River are not stocked with salmon, which will continue to provide us with a good comparison to stocked streams. The Vermont Department of Fish and Wildlife is still very committed to providing quality trout angling in the White River basin and will continue these efforts through habitat protection and enhancement, appropriate fishing regulation and the cautious use of stocked fish.

Comment: Fishing was good until they took the pipes out.

Response: The bugs that fish eat could benefit from the addition of nutrients in untreated wastewater. However, state and federal law protect uses such as swimming and boating as well as fishing. The presence of untreated wastewater in surface waters would present a health risk that would be in conflict with goals for safe swimming or boating.

Chapter 6. Establishing Management Goals for Surface Waters

Comment: Strategies # 57, 58, and 59 should also provide for educational as well as technical assistance.

Response: Strategies 57, 58 and 59 now reads that information as well as technical assistance will be provided.

Typing and Classification

Comment: Classification and typing of waters seems to favor the least controversial approach, versus a stance that places waters in their highest legitimate classification that is more consistent with the goal of anti-degradation. The encouragement by the Agency on page 62 for localities and organizations to pursue B1 classification on waters that the Agency believes may qualify for such status is an example of this approach and simply abdicates the Agency's own mission. Many of the ridgeline headwater areas that are proposed as B2 would also seem to qualify for B1 based upon a superficial analysis of land use.

Response: The Vermont Water Quality Standards guided the development of DEC's proposal for typing Class B waters. The Standards state that the plan shall propose the appropriate Water Management Type or Types based on both the existing water quality and reasonably attainable and the desired water quality management goals (VWQS, Section 1-02 D5.). The Standards also require that town and regional plans be considered in the basin planning process (VWQS, Section 1-02 D3). DEC identified desired water quality management goals for waters passing through private lands on the basis of town and regional plans and pre-existing licenses, permits or long-standing management of surface waters. DEC has identified the goals for public land and associated waters using applicable land use management plans. Although the present land use within ridgeline headwater areas may support water quality or quantity characteristics of B1 waters, the applicable goals in many town and regional plans do not.

Comment: DEC needs to talk to people about Farnsworth Brook's role as a water supply to ensure that there is no burden on people up stream

Response: The information DEC has received through discussions with people in the Farnsworth Brook watershed indicates that the Brook may still be used as a water supply. For this reason, the plan recommends retaining the designation of Farnsworth Brook as an A(2), a public water supply. When the Vermont Water Resources Board considers the ANR proposal for typing and re-classifying waters in the basin, it will accept information from the public regarding the present classification of Farnsworth Brook.

Existing Uses

Comment: The following uses should be added to the list of existing uses:

- o Boating along the entire mainstem,
- o Swimming at Sinclair's Rock and the Sharon access

Response: Once an existing use is identified, it must be protected. The potential impact that the designation may have on uses requires that DEC correctly identify existing uses. DEC has based the list of existing uses on documentation that the areas are regionally important for a water-related use.

Documentation for boating includes the 1989 report by Jerry Jenkins for DEC entitled *Vermont's Whitewater Rivers*, and the Appalachian Mountain Club, 1989 River Guide for New Hampshire and Vermont. Based on the comments received and the AMC River Guide, DEC added boating on the section of the mainstem between Granville and Stockbridge as an existing use (1 mile north of the VT 100/125 junction in Hancock).

The list of existing uses based on swimming only includes regionally important swimming spots that are maintained for public use. Documentation for swimming spots includes the White River Partnerships' inventory of recreational access sites. Sinclair's Rock and the Sharon access are not included in the plan as existing uses: Sinclair's Rock is not maintained for public use and the Sharon access was identified as important for boating, but not swimming. Surface waters that support informal swimming sites of regional importance are not included in the plan as existing uses, but may be identified by DEC during the review or permit applications.

The list of existing uses in the plan is meant to provide an example for how existing uses are identified. Many other surface waters in the White River Basin have existing uses that DEC has not yet identified.

In the next basin planning process, DEC would like to work with the public to develop a process for documenting existing uses. In the meantime, DEC may identify existing uses during the review of permit applications. In the review of any project, DEC will have to determine whether or not the project will affect any existing use.

Comment: Rochester's plan to build new leach fields should be considered before designating swimming at Lion's Club Park as an existing use.

Response: Existing uses must be protected. DEC has determined that the leach fields will not compromise the health of anyone who swims at Lion's Club Park. The leach fields are downstream of the park. In addition, the leach fields are designed to keep any pathogens from reaching surface waters.

Outstanding Resource Waters

Comment: The planning commission of Ripton supports the designation of the Ripton portions of the White River as an Outstanding Resource Waters for water quality, adequate stream flow and recreation. The commission believes that the site of the threatened plant species that occurs in the area of Skylight Pond would be best protected by designation of the area as an ORW.

Response: As stated in Strategy 59, DEC would offer technical assistance to a community-led effort to designate a surface water as an ORW.